ANNUAL REPORT

EXPLORATION LICENCE 25338

BURT PLAIN

FOR THE PERIOD 8/1/08 to 7/1/09

YEAR 2

by

JOHN FABRAY

BSc (Hons) MSc MAusIMM

1:250000 Alice Springs

1:100000 Burt

February 2009
LIST OF CONTENTS

Title Page
List of Contents
List of Figures
List of Tables

INTRODUCTION
Background
Location and Access
Climate
Topography and vegetation

TENURE
Mining/Mineral Rights
Land Tenure
Native Title
Aboriginal Sacred Sites

GEOLOGY
Regional Geology
Local Geology

PREVIOUS EXPLORATION
Exploration by previous companies
Exploration by Western Desert Resources

EXPLORATION COMPLETED DURING CURRENT YEAR
Petrological investigation
Drill core assays – platinoids
Bore water and stream sediment sampling
Geophysical surveys

RESULTS AND EXPENDITURE
Discussion of results
Expenditure

PROPOSALS FOR FUTURE WORK
Proposed work programme for 2009

REFERENCES

APPENDICES
1. Petrology report
2. Assay results – Pt and Pd
3. Bore water and stream sediment sampling and results
4. Regional gravity survey
5. Airborne EM survey - logistics report
6. Airborne EM survey – data
7. Ground magnetic traverse data
LIST OF FIGURES

1. EL 25338 - Location map showing topography.
2. EL 25338 – Land tenure map showing pastoral leases and aboriginal land claims.
3. EL 25338 – Regional geology.
4. EL 25338 – Location of water bore and stream sediment samples.
5. EL 25338 – Location of gravity stations.
6. EL 25338 – Location of ground magnetic traverse.
INTRODUCTION

BACKGROUND
The Exploration Licence was held by A W Mackie until it was acquired by Western Desert Resources Ltd in May 2007. The tenement covers the prospective combined magnetic/gravity anomalies at the Capricorn Prospect. NuPower Resources Ltd are farming in to the tenement and exploring for energy metals.

LOCATION AND ACCESS
The tenement is located about 40km north of Alice Springs in the southern part of the Northern Territory (Figure 1).

Access is by the sealed Stuart Highway from Alice Springs, and thence by station tracks.

CLIMATE
The climate is arid, sub-tropical with cold winters and hot summers. The average annual rainfall is 280mm with most falls in summer months.

TOPOGRAPHY AND VEGETATION
The Burt Plain project is located in flat feature-less country. Intermittent creeks cross the area. The soils are poorly developed on sand dunes. Vegetation is sparse.

TENURE

MINING/MINERAL RIGHTS
EL 25338 was granted to A W Mackie on 8th January 2007. The licence was purchased by WDR Base Metals Pty Ltd, a wholly owned subsidiary of Western Desert Resources Ltd, on May 2nd 2007.

Western Desert Resources Ltd entered into a joint venture agreement with NuPower Resources Ltd for energy minerals over this tenement in February 2008.

LAND TENURE
The tenement is located within the boundaries of Perpetual Pastoral Leases 960 (Bond Springs), 1145 (Hamilton Downs) and 904 (Yamba), as shown on figure 2.

NATIVE TITLE
The Burt Plain project does not currently fall within the area of a registered Native Title Claim.

A Native Title agreement was signed between Western Desert Resources Ltd and the Central Land Council on 20th September 2007.

ABORIGINAL SACRED SITES
There are no known sacred sites within the project area.
GEOLGY

REGIONAL GEOLGY
The tenement is located within the Arunta Block of Palaeoproterozoic to Mesoproterozoic age. The block consists of meta-igneous and meta-sedimentary rocks which have been strongly deformed and metamorphosed up to granulite facies.

LOCAL GEOLGY
The project area is underlain by high-grade metamorphic rocks of the Strangways Metamorphic Complex, which forms part of the Central Province of the Arunta Block (Figure 3). These rocks are exposed in the north eastern part of the area and crop out intermittently in the western portion of the licence. Much of the tenement is covered by up to 120m of Recent to Tertiary sediments.

The tenement is characterised by a major coincident magnetic and gravity anomaly which has been called the Capricorn prospect. The gravity data show a Bouguer anomaly with an amplitude of 11 milligals (Figure 4) which is associated with an aeromagnetic anomaly of greater than 5,000nT (Figure 5).

PREVIOUS EXPLORATION

EXPLORATION BY PREVIOUS COMPANIES

White Range Gold NL (1990)
This company drilled a line of five vertical RC percussion holes over the northern part of the Capricorn Prospect, just to the west of the Stuart Highway. The holes were drilled to a depth of about 70m and intersected magnetite-bearing mafic granulites at depths between 40 and 50m. The magnetite content of the two southern-most holes was up to 15%.

Roebuck Resources NL (1994-1996)
Roebuck explored the area for carbonatite and kimberlite pipes by means of air photo interpretation. No significant results were reported.

Rio Tinto Exploration Pty Ltd (1996-1997)
Exploration for Ni-Cu-PGE deposits associated with layered igneous intrusives was undertaken. The work included airborne magnetic, radiometric and EM surveys; ground magnetic and EM surveys; and one RC percussion hole within the current EL.

Rio Tinto reported that exploration to the west of the Capricorn Prospect had identified a strongly deformed, metamorphosed layered igneous complex. The magnetic anomalies within EL 25338 were interpreted as reflecting the basal ultrabasic zones of the complex at its eastern margin.

The single RC percussion hole was located to the north of the Capricorn Prospect and intersected basic gneiss at a depth of 78m below cover.
EXPLORATION BY WESTERN DESERT RESOURCES

2006
Western Desert Resources (WDR) undertook a gravity traverse with a station spacing of 200m over the Capricorn Prospect in 2006. The survey followed the Stuart Highway and delineated a Bouguer anomaly with an amplitude of 11 mgal coincident with the aeromagnetic anomaly.

2007
Work completed by WDR in 2007 has been reported in the previous annual report. Exploration activities included a gravity survey, an IP survey and a five hole diamond drilling programme.

EXPLORATION COMPLETED DURING CURRENT YEAR

PETROLOGICAL INVESTIGATION
Five drill core samples were submitted to Pontifex and Associates for thin section preparation and description. The Pontifex report is shown in appendix 1.

DRILL CORE ASSAYS – PLATINOIDS
All of the samples (735) which had previously been submitted for multi-element scans were reassayed by ALS Chemex for platinum and palladium. The method used a 30g sample which was fire-assayed and analysed by ICP-MS. The results are shown in appendix 2.

BORE WATER AND STREAM SEDIMENT SAMPLING
NuPower Resources Ltd sampled the water from three station bores and three of the 2007 drillholes. Eight stream sediment samples were also collected. The sample details and results are shown in appendix 3. The locations of the samples are shown in figure 4.

GEOPHYSICAL SURVEYS
NuPower Resources Ltd (NUP) undertook an airborne EM survey and a regional gravity survey over the tenement during the year.

WDR hired a contractor to read a line of detailed ground magnetics over the Capricorn magnetic/gravity anomaly.

Gravity Survey
As part of Central Arunta Gravity survey commissioned by the NT Geological Survey, NUP contracted Atlas Geophysics to infill the 4km grid with gravity readings at 2km. The data obtained is located in appendix 4. The locations of the gravity stations are shown in figure 5. Details of the survey parameters can be found on the NTGS website.

Airborne EM survey
NUP contracted Fugro Airborne Surveys Pty Ltd to fly an airborne electromagnetic and magnetic survey over the tenement. The TEMPEST system was used. The traverse line spacing was 1000m with a nominal terrain clearance of 120m. The survey logistics report can be found in appendix 5. The survey data can be found in appendix 6.
Detailed ground magnetic traverse
WDR contracted AMG Surveys to acquire 5km of ground magnetic data over the central part of the tenement. The data and reports are located in appendix 7. The survey location is shown on figure 6.

RESULTS AND EXPENDITURE

Discussion of results
The petrographic work indicated that the samples of drill core were mafic granulite-facies gneisses which were derived from basic igneous rocks.

The samples analysed for platinum and palladium recorded no anomalous values.

The results of the bore water and stream sediment geochemistry are not considered to be anomalous.

No interpretation of the gravity and EM data has been received to date from NuPower Resources Ltd.

The detailed magnetic traverse was undertaken to determine whether zones of increased magnetite content occurred within the mafic gneiss body causing the Capricorn magnetic anomaly. There were some indications in the data that zones of increased magnetism occurred along the traverse.

Expenditure
The expenditure commitment for Year 2 was $60,000. Actual expenditure was approximately $147,000, the details of which are shown on the accompanying exploration expenditure form.

PROPOSALS FOR FUTURE WORK

Proposed work programme for 2009 – Year 3
The proposed exploration programme for year 3 may include interpretation of the airborne EM, bore water sampling and gravity survey programs to assist with targeting drill holes and scout rotary mud drilling as warranted. It is also planned to carry out reconnaissance geological mapping and sampling of the areas of outcropping basement rock in the eastern part of the tenement.

The proposed expenditure for year 3 is $70,000.

References